

TABLE 51-B

R&D paid for by the company and others and performed by the company outside of the United States, by selected location, industry, and company size: 2016 (part B)

(Millions of U.S. dollars)

Industry and company size	NAICS code	Total outside the United States	Argentina	Brazil	Chile	Mexico	Other Latin American locations	Australia	China	Hong Kong	India	Indonesia	Japan	Malaysia	New Zealand	Singapore	South Korea	Taiwan	Thailand	Other Asian or Pacific locations	Israel	Other Middle Eastern locations	South Africa	Other African locations	Undistributed
All industries	21-23, 31-33, 42-81	77,146	275	1,332	100	860	1,342	1,492	6,273	214	6,234	30	3,108	797	140	2,001	1,212	1,183	219	681	3,724	163	167	84	2,126
Manufacturing industries	31-33	52,689	182	1,146	58	729	1,233	990	4,623	159	3,192	26	2,258	776	69	1,559	1,058	909	177	442	2,527	116	72	29	1,022
Food	311	994	3	87	0	28	11	49	161	*	5	4	6	1	3	22	4	*	8	27	*	8	7	2	158
Chemicals	325	12,313	112	267	35	124	121	247	708	38	298	6	767	9	9	189	64	73	22	45	106	52	35	12	45
Pharmaceuticals and medicines	3254	9,914	78	141	25	77	89	231	478	24	268	3	705	6	9	92	59	68	13	19	89	41	24	10	21
Other chemicals	other 325	2,399	34	126	11	47	32	15	230	15	30	3	62	3	*	96	6	5	9	26	17	11	11	1	24
Plastics and rubber products	326	831	23	70	*	21	4	5	107	8	5	1	66	1	2	2	52	12	3	*	0	9	*	1	31
Nonmetallic mineral products	327	185	0	0	0	5	0	*	16	0	1	0	31	0	0	0	44	9	0	0	20	0	0	0	*
Fabricated metal products	332	245	1	1	*	3	*	2	40	1	5	*	40	1	0	1	0	1	3	2	*	2	*	0	2
Machinery	333	3,179	2	98	*	21	1	39	316	5	106	*	72	9	11	211	95	203	2	11	59	6	4	*	74
Computer and electronic products	334	20,791	24	55	1	141	991	111	2,277	64	2,483	2	861	746	36	1,009	207	563	123	257	2,192	11	12	5	527
Electrical equipment, appliances, and components	335	1,436	*	55	0	13	6	4	228	14	24	*	70	*	0	41	24	11	*	29	2	5	0	0	*
Transportation equipment	336	9,050	D	463	D	327	8	412	422	13	206	1	177	4	*	8	528	27	7	14	43	D	13	D	166
Miscellaneous manufacturing	339	2,792	D	22	D	17	50	116	291	10	50	*	161	5	*	46	24	10	*	40	105	2	D	D	D
Other manufacturing	312-16, 321-24, 331, 337	873	D	28	D	27	40	6	57	6	9	13	9	*	8	31	15	0	9	16	0	D	D	*	D
Nonmanufacturing industries	21-23, 42-81	24,457	93	186	42	131	109	501	1,649	55	3,042	4	849	20	71	442	154	274	42	239	1,197	46	95	55	1,104
Wholesale trade	42	12	i	0	0	0	0	0	2	0	*	0	0	0	0	0	*	0	0	0	0	0	0	0	4
Information	51	13,384	16	69	18	51	35	278	1,039	23	2,107	*	221	5	41	143	59	119	5	183	800	17	29	46	D
Telecommunications	517	49	*	*	0	*	1	1	3	*	12	0	0	0	1	*	3	0	0	0	0	0	0	0	1
Data processing, hosting, and related services	518	1,752	*	4	*	3	24	63	44	2	257	0	13	1	29	10	3	8	*	12	88	*	13	0	75
Other information	other 51	11,583	16	65	18	48	10	214	991	22	1,838	*	208	5	11	133	53	111	4	170	711	16	15	46	D
Professional, scientific, and technical services	54	9,176	72	107	17	65	72	196	550	10	585	3	518	8	14	262	82	154	13	49	368	6	65	9	D
Architectural, engineering, and related services	5413	64	0	2	0	0	0	0	7	0	3	0	2	0	0	0	0	*	0	0	0	0	0	0	*
Scientific research and development services	5417	5,412	71	69	15	45	32	116	286	10	198	2	451	8	11	190	82	31	13	14	47	6	62	4	D
Biotechnology research and development	541711	1,615	8	11	4	19	9	60	82	3	14	*	42	2	4	16	25	9	2	2	17	1	4	*	1
Other scientific research and development	other 5417	3,797	63	58	11	26	23	56	204	7	184	2	409	6	7	173	57	23	10	12	30	5	58	4	D
Other professional, scientific, and technical services	other 54	3,701	1	36	2	20	39	80	257	*	384	1	65	*	3	72	1	123	*	36	321	*	3	5	727
Other nonmanufacturing	21-23, 44-45, 48-49, 52-53, 55-56, 621-24, 71-72, 81	1,885	5	10	8	16	2	27	58	21	350	*	110	7	16	37	12	*	24	7	28	24	2	*	179
All companies (number of domestic employees)	-	77,146	275	1,332	100	860	1,342	1,492	6,273	214	6,234	30	3,108	797	140	2,001	1,212	1,183	219	681	3,724	163	167	84	2,126
Micro companies ^a																									
5-9	-	145	0	0	0	0	D	*	11	*	2	0	0	0	0	0	*	2	0	0	D	0	0	0	D
Small companies																									
10-19	-	101	0	0	0	0	D	*	6	1	3	0	*	0	0	0	15	1	0	*	14	0	0	0	D
20-49	-	338	*	*	*	1	*	42	23	1	58	0	2	*	*	1	3	21	*	2	8	0	0	0	50

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Industry and company size	NAICS code	Total outside the United States	Argentina	Brazil	Chile	Mexico	Other Latin American locations	Australia	China	Hong Kong	India	Indonesia	Japan	Malaysia	New Zealand	Singapore	South Korea	Taiwan	Thailand	Other Asian or Pacific locations	Israel	Other Middle Eastern locations	South Africa	Other African locations	Undistributed						
Medium companies																															
50-99	-	364	*	*	*	3	D	4	37	1	36	0	9	*	*	9	2	38	0	2	21	0	D	0	67	i					
100-249	-	1,319	1	5	0	6	46	i	6	154	7	69	12	11	*	3	60	*	114	1	15	D	1	17	0	103	i				
Large companies																															
250-499	-	1,774	9	8	*	20	1	11	157	17	119	1	54	4	12	71	101	63	1	20	30	*	1	0	88	i					
500-999	-	2,159	7	8	*	42	4	21	150	15	119	*	112	152	i	3	32	12	50	3	11	139	4	2	0	329	i				
1,000-4,999	-	15,626	16	132	i	7	74	119	i	325	1,486	52	1,642	5	424	78	39	297	91	210	49	234	i	508	20	22	22	277	i		
5,000-9,999	-	8,986	22	i	68	13	i	89	607	92	487	16	890	1	356	222	9	444	125	239	106	187	261	i	8	D	1	D			
10,000-24,999	-	14,661	156	i	415	37	i	161	383	i	236	1,060	29	789	8	1,136	21	51	828	204	175	21	i	95	220	58	80	i	14	265	i
25,000 or more	-	31,672	64	694	42	464	180	755	2,701	76	2,507	3	1,002	319	23	260	658	270	36	116	2,507	72	24	47	730	i					

* = amount < \$500,000; D = data withheld to avoid disclosing operations of individual companies; i = > 50% of the estimate is a combination of imputation and reweighting to account for nonresponse.

NAICS = 2012 North American Industry Classification System.

^a Business R&D and Innovation Survey does not include companies with fewer than five domestic employees.

Note(s)

Detail may not add to total because of rounding. Country detail was not asked on Form BRDI-1(S). Industry classification is based on the dominant business code for domestic R&D performance, where available. For companies that did not report business codes, the classification used for sampling was assigned. Statistics are representative of companies located in the United States that performed or funded R&D.

Source(s)

National Science Foundation, National Center for Science and Engineering Statistics, and U.S. Census Bureau, Business R&D and Innovation Survey, 2016.